

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/871,600	05/31/2001	Akira Arai	9319A-000222	8588
27572	7590 02/03/2004		EXAMINER	
HARNESS, DICKEY & PIERCE, P.L.C.			SHEEHAN, JOHN P	
P.O. BOX 828 BLOOMFIELD HILLS, MI 48303			ART UNIT	PAPER NUMBER
BLOOMFIEL	LD HILLS, WII 46303		1742	9 l
			DATE MAILED: 02/03/200	21

Please find below and/or attached an Office communication concerning this application or proceeding.

				<u> </u>			
		Application No.	Applicant(s)	•			
Office Action Summary		09/871,600	ARAI ET AL.				
		Examin r	Art Unit				
		John P. Sheehan	1742				
Period fo	The MAILING DATE of this communication ap or Reply	p ars on the cover sh t wi	th th correspondence address -	•			
THE I - External after - If the - If NO - Failu - Any r	ORTENED STATUTORY PERIOD FOR REPL MAILING DATE OF THIS COMMUNICATION. nsions of time may be available under the provisions of 37 CFR 1. SIX (6) MONTHS from the mailing date of this communication. period for reply specified above is less than thirty (30) days, a rep period for reply is specified above, the maximum statutory period are to reply within the set or extended period for reply will, by statuted the period by the Office later than three months after the mailing and patent term adjustment. See 37 CFR 1.704(b).	136(a). In no event, however, may a r ly within the statutory minimum of thin will apply and will expire SIX (6) MON e. cause the application to become AB	eply be timely filed y (30) days will be considered timely. THS from the mailing date of this communica ANDONED (35 U.S.C. § 133).	ntion.			
1)⊠	Responsive to communication(s) filed on 17 N	November 2003.					
2a)⊠	This action is FINAL . 2b) ☐ This	action is non-final.					
3)	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Dispositi	ion of Claims						
 4) Claim(s) 1-8,10,12,13,22,24-28 and 31 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. 5) Claim(s) is/are allowed. 6) Claim(s) 1-8, 10, 12, 13, 24-28 and 31-33 is/are rejected. 7) Claim(s) is/are objected to. 8) Claim(s) are subject to restriction and/or election requirement. 							
•	ion Papers	•					
10)	The specification is objected to by the Examine The drawing(s) filed on is/are: a) acceptable and applicant may not request that any objection to the Replacement drawing sheet(s) including the correct that are the second as a second and a second are the second as a second as a second are the second as a second	cepted or b) objected to drawing(s) be held in abeyaretion is required if the drawing	nce. See 37 CFR 1.85(a). (s) is objected to. See 37 CFR 1.12				
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
12) \(\begin{aligned} & \text{ 13} \\ & \text{ S} \\ & \text{ S} \\ & \text{ S} \\ & \text{ 3} \\ & \text{ a} \\ & \text{ 14} \end{aligned}	Acknowledgment is made of a claim for foreig All b) Some * c) None of: 1. Certified copies of the priority documen 2. Certified copies of the priority documen 3. Copies of the certified copies of the priority documen application from the International Burea See the attached detailed Office action for a list Acknowledgment is made of a claim for domest ince a specific reference was included in the fir 7 CFR 1.78. b) The translation of the foreign language processors acknowledgment is made of a claim for domest ac	ts have been received. Its have been received in A Drity documents have been The (PCT Rule 17.2(a)). It of the certified copies not tic priority under 35 U.S.C. The sentence of the specific The revisional application has be tic priority under 35 U.S.C.	pplication No received in this National Stage received. § 119(e) (to a provisional application or in an Application Data \$ een received. §§ 120 and/or 121 since a spec	Sheet.			
2) Notic	et(s) te of References Cited (PTO-892) te of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449) Paper No(s)	5) 🔲 Notice of I	Summary (PTO-413) Paper No(s) nformal Patent Application (PTO-152)	- ·			

Application/Control Number: 09/871,600

Art Unit: 1742

DETAILED ACTION

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1 to 8, 10, 12, 13, 24 to 28 and 30 to 33 are rejected under 35 U.S.C. 103(a) as being unpatentable over Panchanathan (Panchanathan, US Patent No. 5,72,792).

Panchanathan teaches a magnetic powder having a composition that overlaps the alloy composition recited in the instant claims (Panchanathan, column 1, lines 37 to 50). Panchanathan also teaches a process of making the disclosed magnetic powder that is similar to the process disclosed in the instant application (Panchanathan, column 2, lines 1-21). Panchanathan teaches the presence of a hard and soft magnetic phase (column 1, lines 50 to 57).

The claims and Panchanathan differ in that Panchanathan does not teach the exact same alloy composition, is silent with respect to the claimed expression $(BH)_{max}/\rho^2[x10^{-9}J\cdot m^3/g^2] \ge 2.40 \text{ and does not teach the all the process limitations recited in the dependent claims.}$

However, one of ordinary skill in the art at the time the invention was made would have considered the invention to have been obvious because the alloy proportions

Art Unit: 1742

taught by Panchanathan overlap the instantly claimed proportions and therefore are considered to establish a prima facie case of obviousness. It would have been obvious to one of ordinary skill in the art to select any portion of the disclosed ranges including the instantly claimed ranges from the ranges disclosed in the prior art reference, particularly in view of the fact that;

"The normal desire of scientists or artisans to improve upon what is already generally known provides the motivation to determine where in a disclosed set of percentage ranges is the optimum combination of percentages", In re Peterson 65 USPQ2d 1379 (CAFC 2003).

Also, In re Geisler 43 USPQ2d 1365 (Fed. Cir. 1997); In re Woodruff, 16 USPQ2d 1934 (CCPA 1976); In re Malagari, 182 USPQ 549, 553 (CCPA 1974) and MPEP 2144.05.

Further, in view of the fact that the alloys taught by Panchanathan are made by a process which is similar to, if not the same as, applicants' process of making the instantly claimed alloy, the alloys taught by Panchanathan would be expected to posses all the same properties as recited in the instant claims, including, In re Best, 195 USPQ, 430 and MPEP 2112.01.

"Where the claimed and prior art products are identical or substantially identical in structure or composition, or are produced by identical or substantially identical processes, a prima facie case of either anticipation or obviousness has been established, In re Best, 195 USPQ 430, 433 (CCPA 1977). When the PTO shows a sound basis for believing that the products of the applicant and the prior art are the same, the applicant has the burden of showing that they are not.' In re Spada,15 USPQ2d 655, 1658 (Fed. Cir. 1990). Therefore, the prima facie case can be rebutted by evidence showing that the prior art products do not necessarily possess the characteristics of the claimed product. In re Best, 195 USPQ 430, 433 (CCPA 1977)." (emphasis added by the Examiner), see MPEP 2112.01.

Art Unit: 1742

The coercive force recited in the applicants' claims is not the coercive force of the claimed magnetic powder but rather is the coercive force of a bonded magnet made from the claimed powder. The properties of the bonded magnet made from applicants' claimed powder would be expected to be a function of the process used to make the bonded magnet, such as for example, the amount of binder used. In view of this, the coercive force recited in the instant claims is not considered to distinguish the claimed alloy powder from Panchanathan's powder.

With respect to the process limitations recited in the instant claims it is the Examiner's position that the process limitations recited in the instant product by process claims do not necessarily lend patentability to the claimed product, MPEP 2113.

Response to Arguments

For the following reasons the Examiner has dropped the rejection based on Hamano:

- The applicants' arguments set forth in the response submitted November
 2003; and
- II. In making the rejection based on Hamano, the Examiner cited Hamano's Table 4, the 5th column as teaching a powder particle size of from 34 to 93 microns. However, a spot translation of the heading for Table 4, column 5, indicated that the heading for said column is directed to the thickness of Hamano's powder and not to the average particle size of the powder as the Examiner originally alleged. In view of this, it

is the Examiner's position that Hamano does not teach or suggest the powder particle size of 1 to 50 microns as now recited in the applicants' claims.

Applicant's arguments filed November 17, 2003 regarding Panchanathan have been fully considered but they are not persuasive.

Applicants' argument that the instant claims now recite a powder particle size of 1 to 50 microns whereas Panchanathan teaches a powder particle size of 200 microns is not persuasive. The powder particle size of 200 microns disclosed by Panchanathan is the only mention of particles size by Panchanathan and is Panchanathan's preferred powder particle size (column 2, lines 15 and 16). The teachings of a reference are not limited to merely that which is set forth in the examples or the disclosed preferred embodiments. Instead "[a] reference may be relied upon for all that it would have reasonably suggested to one having ordinary skill in the art", MPEP 2123. Except for the statement that a powder particle of 200 microns is preferred, Panchanathan is silent with respect to the powder particle size. In view of this, and the fact that a reference is not limited to its disclosed preferred embodiments it is the Examiner's position that Panchanathan is not limited to any particular powder size but rather encompasses any powder particle size including a particle size of 1 to 50 microns as recited in applicants' claims.

Conclusion

3. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

Art Unit: 1742

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to John P. Sheehan whose telephone number is (571) 272-1249. The examiner can normally be reached on T-F (6:45-4:30) Second Monday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Roy King can be reached on (571) 272-1244. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

John P. Sheehan Primary Examiner Art Unit 1742

jps